**The Claims**

1. A fastener which includes:

   (a) a fastening element having a beam, an engagement means located on one side of the beam, a base and a flex point separate from the beam; and

   (b) actuating means attached to the fastening element and including a material adapted to contract when activated;

   wherein the beam is movable, upon contraction of the material, between an engagement position and a disengagement position, and wherein the base has a first arm and a second arm joined by the flex point, the beam being located at one end of the first arm and the flex point being located on the same side of the beam as the engagement means.

2. The fastener of claim 1, wherein the engagement means is located at or towards one end of the beam of the fastening element.

3. The fastener of claim 2, wherein the engagement means includes a projecting wedge.

4. The fastener of claim 1, wherein the material adapted to contract when activated is shape memory alloy wire.

5. The fastener of claim 4, wherein the shape memory alloy wire is contained within one or more grooves in the beam.

6. The fastener of claim 5, wherein the one or more grooves are located on one side of the beam and the engagement means is located on the opposite side of the beam.

7. The fastener of claim 1, wherein the beam is integral with the base.

8. The fastener of claim 1, wherein a bias means is located between the first and second arms.

9. The fastener of claim 8, wherein the bias means is a leaf spring.

10. The fastener of claim 1, which includes a microprocessor.

11. The fastener of claim 10, wherein the microprocessor is adapted to control energy delivery to the material adapted to contract when activated.

12. The fastener of claim 10, wherein the microprocessor is adapted to sense whether the engagement means is engaged or disengaged.

13.The fastener of claim 10, wherein the microprocessor is adapted to control temperature of the material adapted to contract when activated.

14.The fastener of claim 12, wherein the microprocessor is adapted to provide a report on whether the engagement means is engaged or disengaged.

15.The fastening system of claim 14, wherein the microprocessor is adapted to provide the report to a network of which the fastener forms a part.

16.A releasable fastening system including:

a pin having a locking cavity;

an aperture for receiving the pin;

a locking means adapted to engage the locking cavity of the pin when the pin is received in the aperture; and

an unlocking means including material adapted to contract when activated,

wherein the locking means comprises or includes engagement means adapted to disengage the locking cavity when the material contracts.

17.The fastening system of claim 16 wherein the pin is a stud, peg or bolt.

18.The fastening system of claim 16, wherein the pin ends in a tapered base.

19.The fastening system of claim 16, wherein the locking cavity is a groove around the perimeter of the pin.

20.The fastening system of claim 16, wherein the locking cavity is one or more indentations in the pin.

21.The fastening system of claim 16, wherein the engagement means is adapted to engage some of the grooves.

22.The fastening system of claim 16, wherein the engagement means is one or more locking elements.

23.The fastening system of claim 16, wherein the engagement means is one locking element being a collar, a bias spring , a circlip or a clip chassis.

24.The fastening system of claim 16, wherein the locking means includes a clip chassis together with a bias spring or a circlip.

25.The fastening system of claim 16, wherein the unlocking means is connected to the engagement means.

26.The fastening system of claim 24, wherein the unlocking means is connected to the clip chassis.

27.The fastening system of claim 22, wherein the engagement means is a single locking element, being a tooth.

28.The fastening system of claim 22, wherein there is a plurality of locking elements, each being a tooth.

29.The fastening system of claim 27, wherein the or each tooth is surrounded by a rotatable shuttle.

30.The fastening system of claim 29, wherein the material adapted to contract when activated is wound around the shuttle.

31.The releasable fastening system of claim 16 wherein the locking means includes a slideable shuttle.

32.The fastening system of claim 16, wherein the material adapted to contract when activated is shape memory alloy wire.

33.The fastening system of claim 16, wherein the aperture has a shape which is the same as the cross-sectional shape of the pin.

34.The fastening system of claim 16 which includes a micro-processor.

35.The fastening system of claim 34, wherein the microprocessor is adapted to control energy delivery to the material adapted to contract when activated.

36.The fastening system of claim 34, wherein the microprocessor is adapted to sense whether the engagement means is engaged or disengaged.

37.The fastening system of claim 34, wherein the microprocessor is adapted to control temperature of the material adapted to contract when activated.

38.The fastening system of claim 16, which includes means to disengage the engagement means without activation of the material adapted to contract when activated.

39.A manual override for a fastening system having a shuttle movable between a locking position and an unlocking position, wherein the override includes a manual actuator adapted to cause the shuttle to move from the locking position to the unlocking

position and means for drawing the manual actuator so that the shuttle moves to the unlocking position.

40.The override of claim 39, wherein the drawing means comprises or includes a rod connected to the manual actuator.

41.The override of claim 39, wherein the drawing means comprises or includes a bowden cable.

42.The override of claim 39, wherein the drawing means is biased towards the locking position.

43.The override of claim 39, wherein the drawing means further includes retaining means.

44.The override of claim 39, when adapted to release more than one of the fastening systems.

45.The override of claim 44, wherein the manual actuator is linked with each fastening system by a connecting rod.

46.A first fastening system connected to a second fastening system by a linkage, the first and second fastening systems being adapted to release by the involvement of means adapted to contract when actuated, the linkage adapted to cause the first and second fastening systems to move to an unlocking position by any one of the following:

(a) activation of the means adapted to contract when activated in the first fastening system;

(b) activation of the means adapted to contract when activated in the second fastening system;

(c) activation of the means adapted to contract when activated in both the first and second fastening system; and

(d) manipulation of a manual override.

47.A fastener assembly including:

(a) an engagement means including latch means and locking means, the engagement means being movable between a locking position and an unlocking position;

(b) biasing means urging the engagement means towards the locking position; and

(c) means for drawing the engagement means from the locking position to the unlocking position, the drawing means comprising or including material adapted to contract when activated.

48.A fastener assembly of claim 47, wherein the engagement means includes a rod or tongue.

49. A strain reduction assembly including:

a material adapted to contract when activated, the material having:

(a) a first pull force at which the material is adapted to move an element to which the material is directly or indirectly connected;

(b) a second pull force greater than the first pull force; and

(c) a third pull force intermediate the first pull force and the second pull force; and

means adapted to be activated when the pull force on the material has reached substantially the third pull force.

50. A fastening system including:

(a) first engagement means;

(b) second engagement means; and

(c) a locking element moveable between a locked position in which the first engagement means is maintained in engagement with the second engagement means and an unlocked position in which the first engagement means is free to disengage from the second engagement means;

wherein the locking element is adapted to be moved to the unlocked position by means adapted to contract when activated, being different from the locking element.

51. An improved framing system, wherein the frame includes one or more attachment nodes and the framing system is adapted to enable delivery of one or more of energy, data and material.

52. A fastener which includes:

(a) a fastening element;

(b) actuating means attached to the fastening element and including a material adapted to contract when activated; and

(c) restoring means adapted to restore the material to a relaxed state when no longer contracted;

wherein the restoring means contains or comprises elastomeric material adapted to be deformed by contraction of the material adapted to contract when activated.